

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1 - 4. (Canceled)

5. (Previously presented) The system of claim 27, in which the hub comprises a plurality of router network adapters, each router network adapter sending a network control process message to a Router Module indicating whether an associated wireless network is operational.

6. (Previously presented) The system of claim 5, in which the Router Module selects one of the wireless networks from a plurality of candidate wireless networks for data transmission only when the Router Module has received the message indicating that the associated candidate wireless network is operational.

7. (Previously presented) The system of claim 6, further comprising a Local Area Network comprising at least one Host Application.

8. (Previously presented) The system of claim 6, in which the Router Module generates a Route Registration packet and sends the Route Registration packet to the server when the Router Module has selected a new wireless network, the Route Registration packet comprising a gateway address of the new wireless network and end point addresses that can be reached via the gateway address,

wherein the server remains aware of all end point addresses that can be reached via the gateway address contained in the Route Registration packet.

9. (Previously presented) The system of claim 27, further comprising a mobile routing device that sends data to one of the mobile clients via the server, wherein the mobile routing device sends data to the client device via the hub, via the server, and at least one of the wireless networks using only an end point address so that the mobile routing device is unaware of the wireless networks used to transport the data and corresponding gateway addresses.

10. (Previously presented) The system of claim 5, further comprising a Router Configuration Module that reads in configuration data for each router network adapter, the configuration data comprising a gateway addresses and at least one end point address.

11. (Previously presented) The system of claim 27, in which a gateway address comprises an IP address and the wireless networks comprise IP networks.

12. (Previously presented) The system of claim 27, in which a gateway address comprises a hardware address.

13 - 14. (Canceled)

15. (Previously presented) The method of claim 24 further comprising:
determining whether the source address is present in a route table;
updating the route table to reflect that data has been received from the wireless network corresponding to the source address, if the source address is present in the route table; and
adding the source address to the route table, if the source address is not present in the route table.

16. (Previously presented) The method of claim 24, further comprising:
receiving the data at an IP stack from a Local Area Network; and
forwarding the data to a Router Manager.

17. (Previously presented) The method of claim 24, further comprising:
determining a subnet that the end point address resides on, and looking up a gateway address in a route table based upon the subnet.

18 - 20. (Canceled)

21. (Previously presented) The system of claim 27, in which the server further comprises a route table that associates each end point address with at least one gateway address,

wherein the server determines a wireless network to use for sending data to each end point address based upon a lookup in the route table.

22 - 23. (Canceled)

24. (Currently amended) A method for routing data between a Host Network Server and a client device over multiple dissimilar wireless networks connected between the Host Network Server and the client device, the method comprising:

receiving a data packet from a source application, the data packet having a source address and an end point address;

looking up the source address of the data packet in a security table to determine whether the end point address is associated with the source address in the security table;

when the source address/end point address combination exists, forwarding the packet, from a routing process to an operating system and then via ~~an associated~~ one of the multiple networks associated with the end point address, to the end point address;

receiving a subsequent consecutive data packet having the source address and the end point address;

looking up the source address of the subsequent consecutive data packet in the security table to determine whether the end point address is associated with the source address in the security table; and

when the source address/end point address combination exists, forwarding the subsequent consecutive data packet, from the routing process to the operating system and then via another ~~associated~~ one of the multiple networks associated with the end point address, to the end point address, the dissimilar wireless networks being continuously connected,

wherein the source application is unaware of which network each packet is being forwarded over.

25. (Canceled)

26. (Currently amended) A method for routing data between a source and a destination over multiple wireless networks connected between the source and the destination, the method comprising:

receiving a request to dynamically alter a router configuration;

dynamically altering the routing configuration;

determining when to switch networks based upon the altered configuration;

transmitting data from a routing process to an operating system and then over a first network of the multiple dissimilar wireless networks, the networks being continuously connected;

dynamically switching from the first network to a second network during data transmission; and

transmitting data from the routing process to the operating system and then over the second network of the multiple dissimilar wireless networks

wherein a source application, which generates the data, is unaware of which network that data is being transmitted over.

27. (Currently amended) A mobile system comprising:

a mobile hub connected to a plurality of dissimilar wireless networks that are available for transmission and reception;

a plurality of mobile clients connected to the mobile hub; and

at least one server connected to the mobile hub via the plurality of dissimilar wireless networks,

wherein a transmission between the mobile hub and the at least one server occurs while switching between at least two of the plurality of dissimilar networks so that the plurality of mobile clients roam between networks; and

wherein source applications in each mobile client, which generate the data being transmitted, are unaware of which network is being used for transmitting.

28. (Previously presented) The method of claim 24, further comprising discarding the data packet when the source address/end point address associated with the data packet is not found in the security table, and discarding the subsequent consecutive data packet when the source address/end point address combination associated with the subsequent consecutive data packet is not found in the security table.

29 - 30. (Canceled)

31. (Currently amended) A computer readable medium storing a program for routing data between a Host Network Server and a client device over multiple dissimilar wireless networks connected between the Host Network Server and the client device, the program comprising:

a first receiving code segment that receives a data packet from a source application, the data packet having a source address and an end point address;

a first look up code segment that looks up the source address of the data packet in a security table to determine whether the end point address is associated with the source address in the security table;

a first forwarding code segment that, when the source address/end point address combination exists, forwards the packet from a routing process to an operating system and then, via ~~an associated~~ one of the multiple networks associated with the end point address, to the end point address;

a second receiving code segment that receives a subsequent consecutive data packet having the source address and the end point address;

a second look up code segment that looks up the source address of the subsequent consecutive data packet in the security table to determine whether the end point address is associated with the source address in the security table; and

a second forwarding code segment that, when the source address/end point address combination exists, forwards the packet from the routing process to the operating system and then, via another ~~associated~~ one of the multiple networks associated with the end point address, to the end point address, the dissimilar wireless networks being continuously connected

wherein the source application is unaware of which network each packet is being forwarded over.

32. (Previously presented) The medium of claim 31, further comprising:

a determining code segment that determines whether the source address is present in a route table;

an updating code segment that updates the route table to reflect that data has been received from the wireless network corresponding to the source address, if the source address is present in the route table; and

an adding code segment that adds the source address to the route table, if the source address is not present in the route table.

33. (Previously presented) The medium of claim 31, in which the data is received at an IP stack from a Local Area Network, and the data is forwarded to a Router Manager.

34. (Currently amended) The medium of claim 31, further comprising a determining ~~source~~ code segment that determines a subnet that the end point address resides on, and looks up a gateway address in a route table based upon the subnet.

35. (Previously presented) The medium of claim 31, further comprising a discard code segment that discards the packet when the combination does not exist.

36 - 38. (Canceled)

39. (Currently amended) A computer readable medium storing a program for routing data between a source and a destination over multiple wireless networks connected between the source and the destination, the medium comprising:

- a receiving code segment that receives a request to dynamically alter a router configuration;

- an altering code segment that dynamically alters the routing configuration;

- a determining code segment that determines when to switch networks based upon the altered configuration;

- a first transmitting code segment that transmits data from a routing process to an operating system and then over a first network of the multiple dissimilar wireless networks;

- a switching code segment that dynamically switches from the first network to a second network during data transmission; and

a second transmitting code segment that transmits data from the routing process to the operating system and then over the second network of the multiple dissimilar wireless networks, the dissimilar wireless networks being available for transmission and reception,

wherein a source application, which generates the data, is unaware of which network that data is being transmitted over.

40. (Previously presented) A method for use with a routing system configured to switch between multiple dissimilar wireless networks during a transmission, the system including an application that is unaware of which wireless networks are used to transport the data from the application, the method comprising:

dynamically receiving a request from the application, the request inquiring about a network status of at least one of the multiple dissimilar wireless networks, the networks being available for transmitting and receiving; and

forwarding a response to the request to the application.